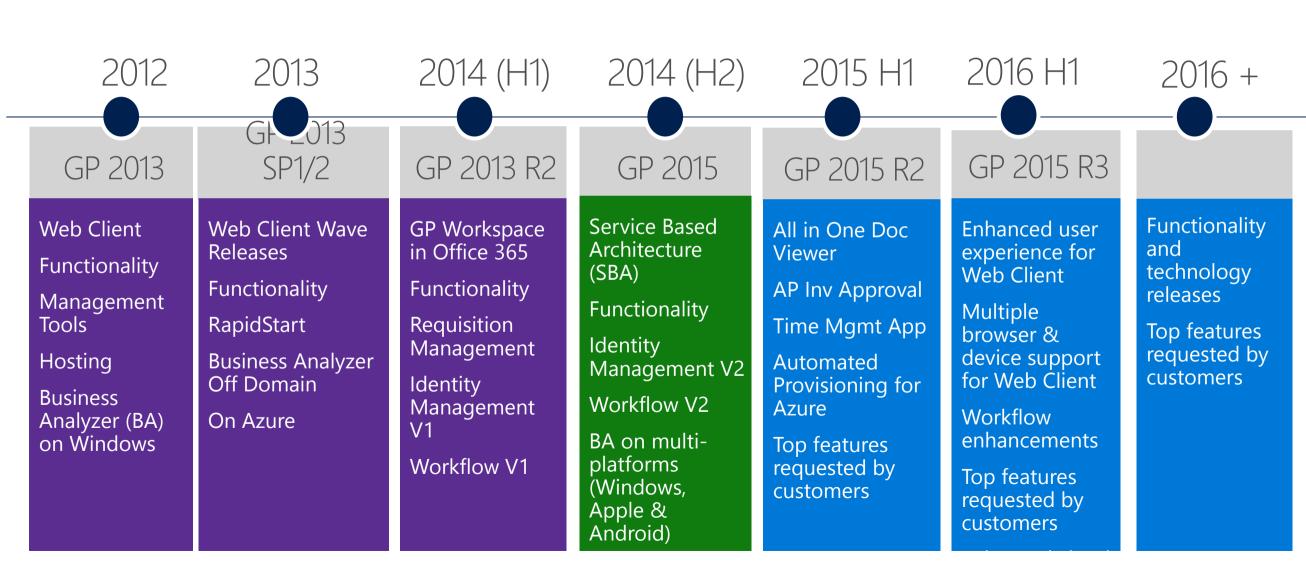






### Microsoft Dynamics GP Roadmap



### Dynamics GP 2015 R2

DEVICES



Apple iPad



Android



WORK













### Service Based Architecture



DEPLOYMENT

Microsoft Dynamics GP

Microsoft Dynamics CRM







### Dynamics GP 2015 R2 Feature Review

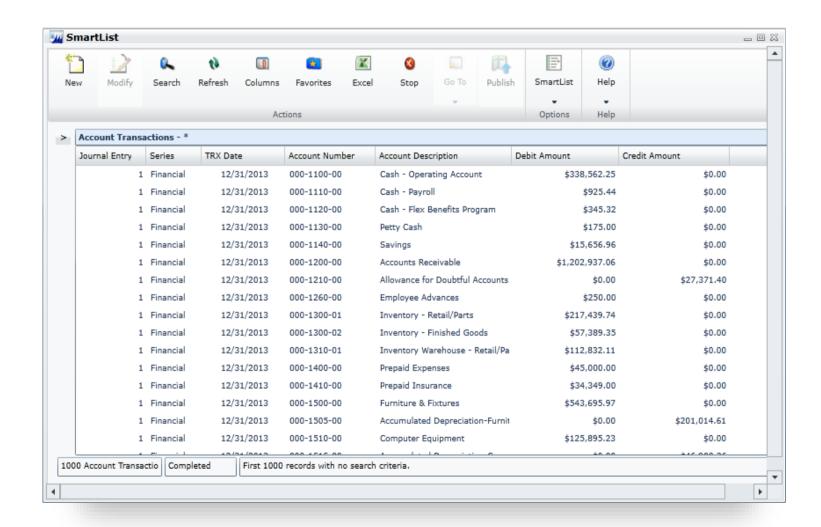
- All-in-One Document Viewer Purchasing
- SQL View Designer
- SmartLists Display Debits then Credits
- SmartLists Default New Favorites to User vs. System
- Hide/Show SSN on Payroll & HR Reports
- View W2
- Combine GL Summary and Detail Inquiry Windows
- Time Management App

- Historical Received Not Invoiced Report
- Auto Deposit Cash Receipts in Bank Rec
- Visual Indicator for Customer Over Credit Limit
- Enable Email for all Sales/Purchasing Forms (Short, Long, Other)
- Self Service User Type
- AP Invoice Workflow Approval
- Workflow Document Attach

# Business Intelligence

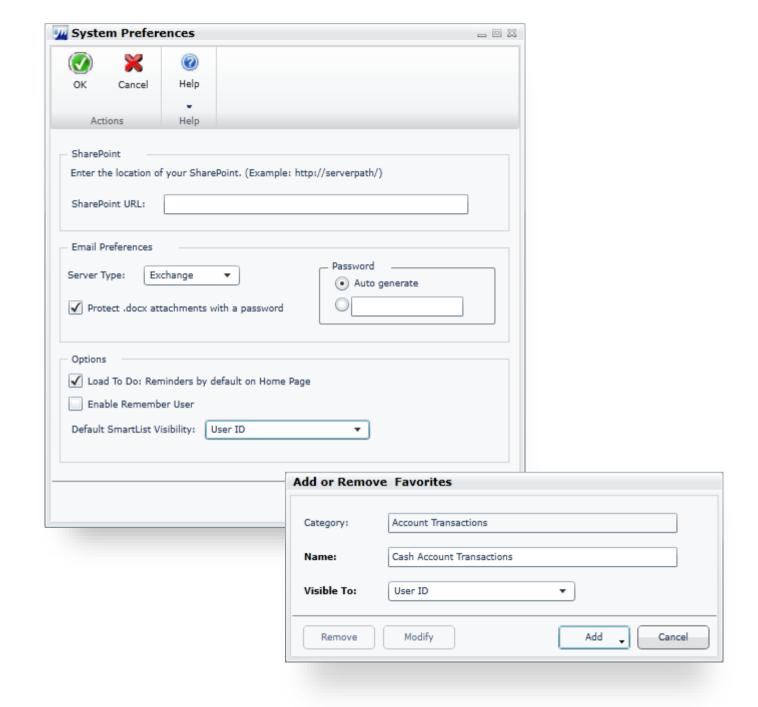
## Display Debits before Credits

- Debits before Credits in:
  - SmartLists
  - Excel Reports
  - Database tables and views



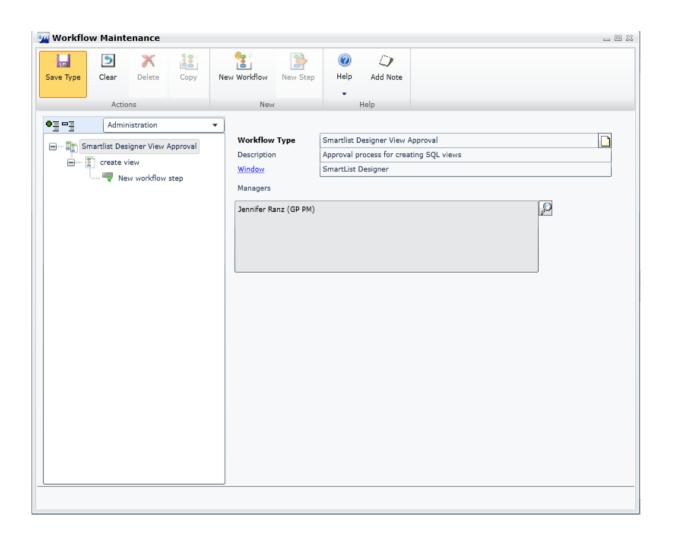
### Default SmartList Visibility

 Allow administrators to select the default visibility for new SmartList Favorites



#### Create SQL Views using SmartList Designer Worfklow

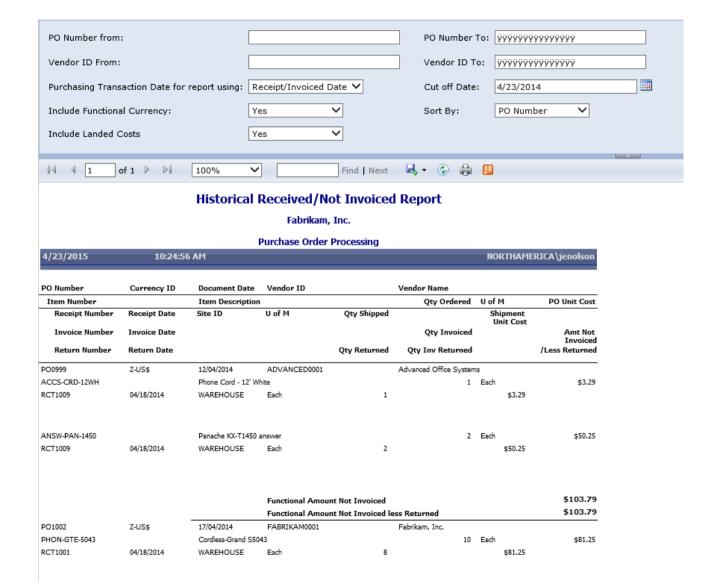
Users can submit
 Smartlist Designer
 queries to workflow to
 create SQL views within
 the Company Database



## Distribution

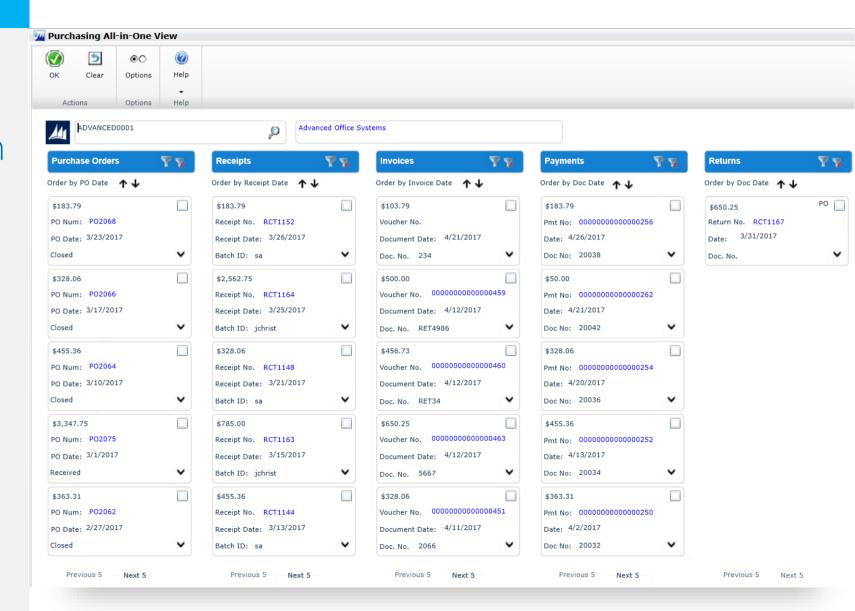
### Historical Received-not-Invoiced Report

Created a new SQL
Reporting Service Report
to have a cutoff date
based on transaction
date or GL post date to
allow customers to use
the report for historical
purposes.



## Purchasing All-in-One Document View

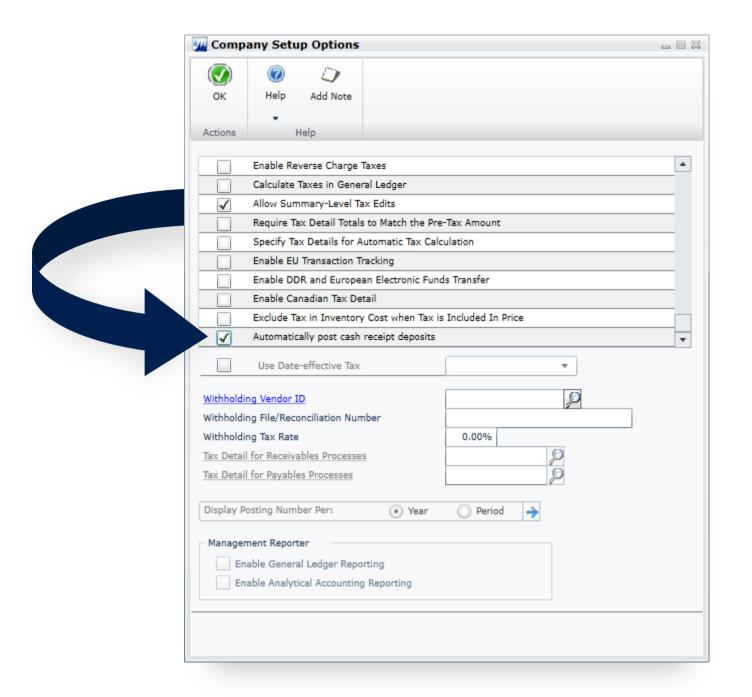
- View all related purchasing documents for a single transaction in one window
  - Select a purchasing invoice and window will refresh to show POs, receipts, payments, etc.
  - Accessible from Vendor Maintenance, many purchasing inquiry windows, navigation lists and the home page



# Financial

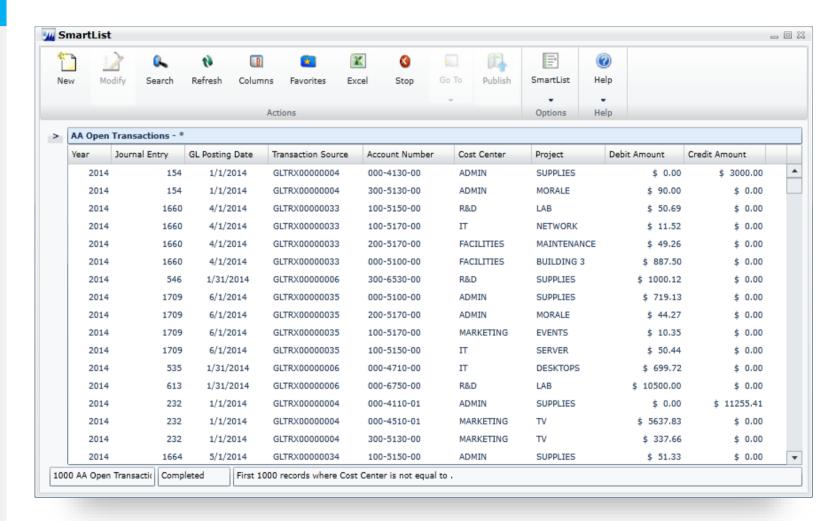
### Automatically Deposit Cash Receipts

Cash receipt deposits are posted automatically



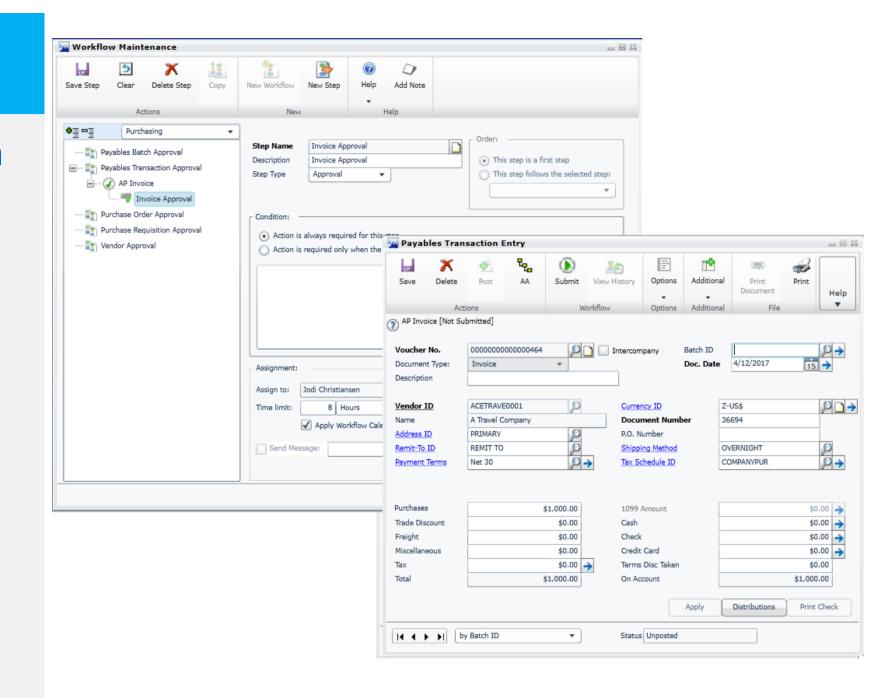
## Analytical Accounting Transaction Lists

- Lists include more data
- Include a column for each transaction dimension
- Improvements apply to:
  - SmartLists
  - Excel Reports



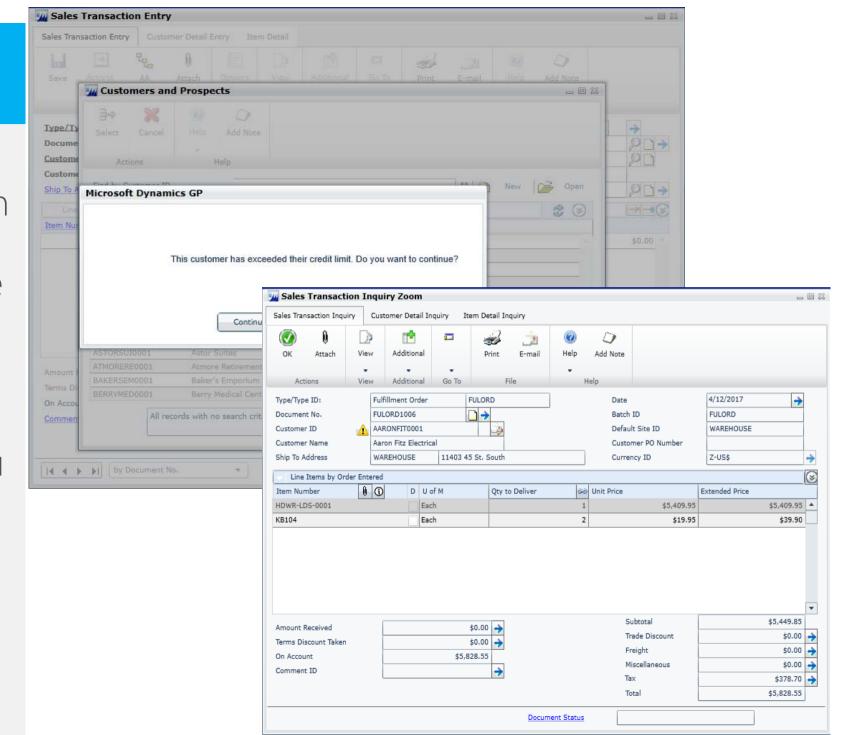
## Payables Transaction Approval Workflow Type

- Workflow approval for a single transaction in Payables Transaction Entry
  - Define workflow process for Payables invoices, charges, credit memos, and returns



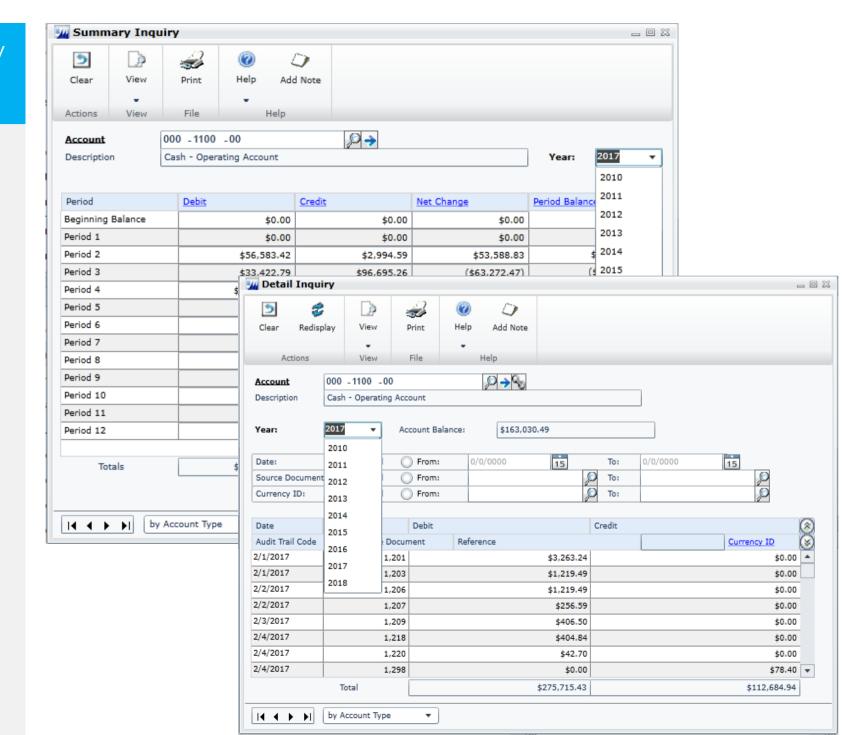
## Visual Indicator for Customer Credit Limit

- New options that determine how and when you are notified of a customer who is over the credit limit you set for them.
- In Receivables Setup, you can select to display an icon or give a warning message for a customer who is over their limit.



## Combine Open and History Inquiries

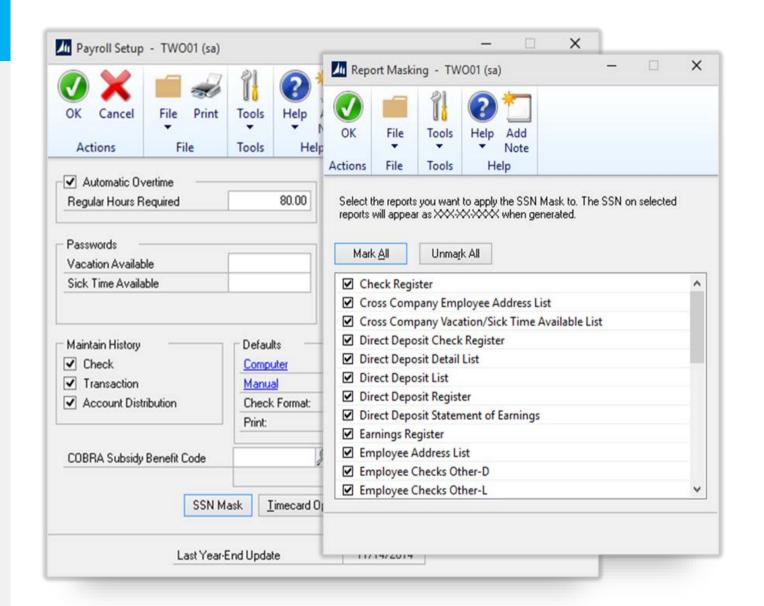
- View open and historical information in the same window for Summary Inquiry, Detail Inquiry and for Account Summary.
- Any GoTo's or drill backs will now go to the single window instead of the user picking open or history.



# Human Resources and Payroll

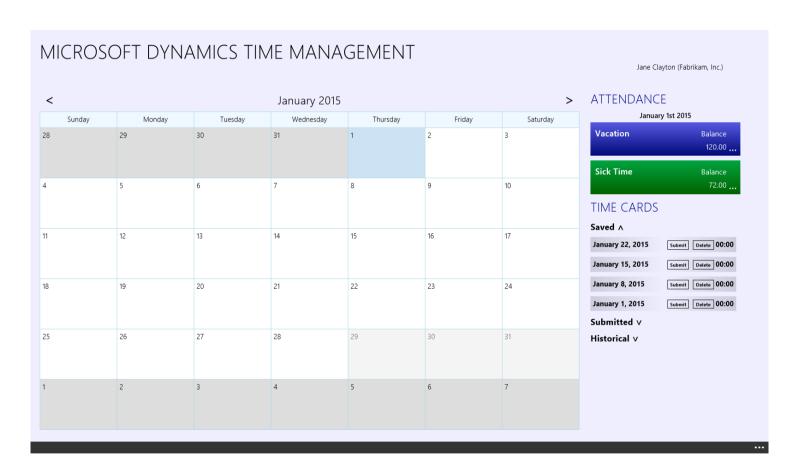
## Mask SSN on Payroll and HR Reports

- Masks the Employee
   Social Security Number
   on selected reports
  - Select which reports you want to mask Social Security Number from the Report Masking window
  - For selected reports, the Social Security Mask will appear as
  - xxx-xx-xxxx when rendered



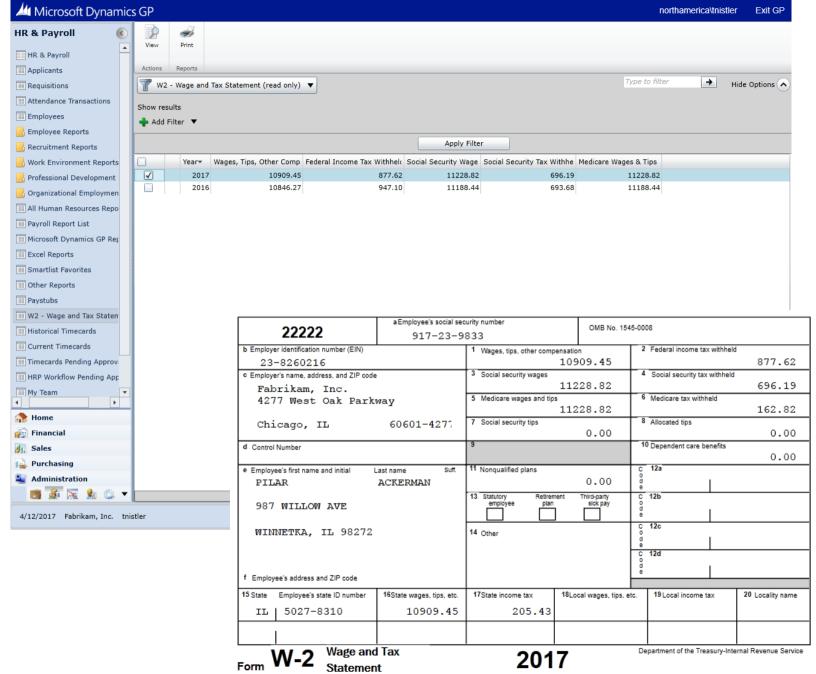
#### Time Management App

 The time Management app will allow GP Employees to enter Vacation and Sick time in Payroll or time off against Benefit Timecodes within HR. The app is available for Windows 8, iOS iPad devices, and Android tablets.



#### View W2 for ESS

- With Employee Self Service W2, the employee can now view and print their own W2.
- The action will display on the Time Management home page part.

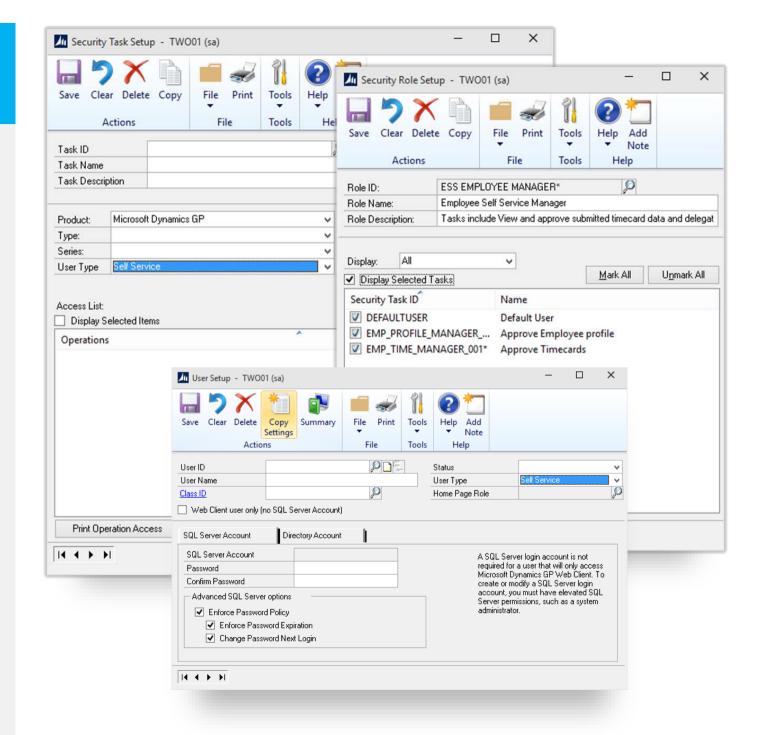


Copy 1-For State, City, or Local Tax Department

# System

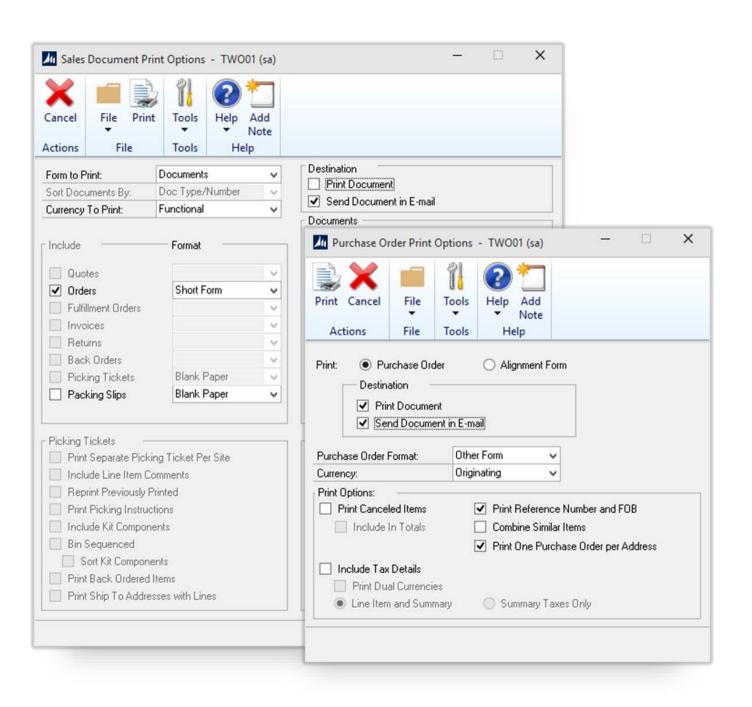
#### Self Service User License

- Support for an additional user type of Self Service
  - Limits the navigation and functionality to essential tasks the self service user will need
  - Security roles tailored to the Self Service User Type
  - Enables user to quickly filter tasks that are available to each user type



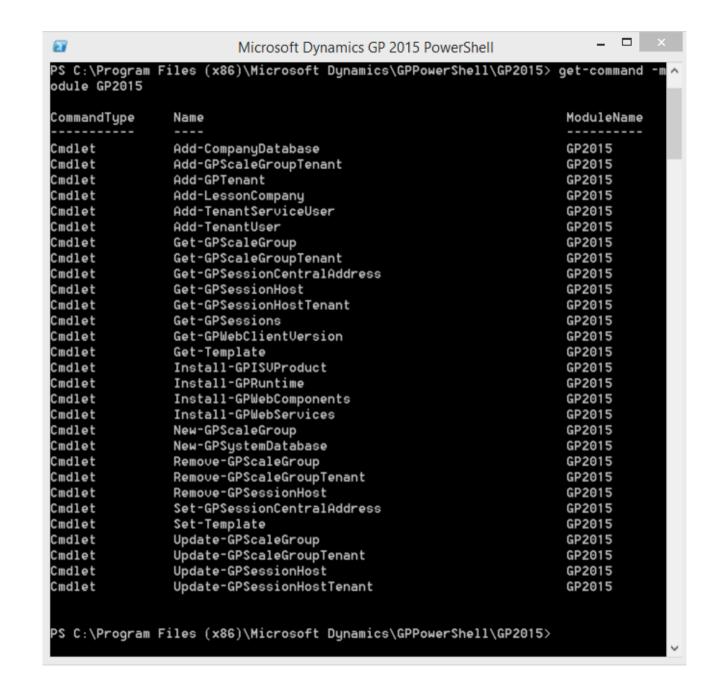
### Enable Email on Report Options

- Enables email support for all document formats
  - Supports all Sales Order Processing document formats
  - Blank
  - Short
  - Long
  - Other
  - Supports all Purchase Order Processing document formats
  - Blank
  - Other



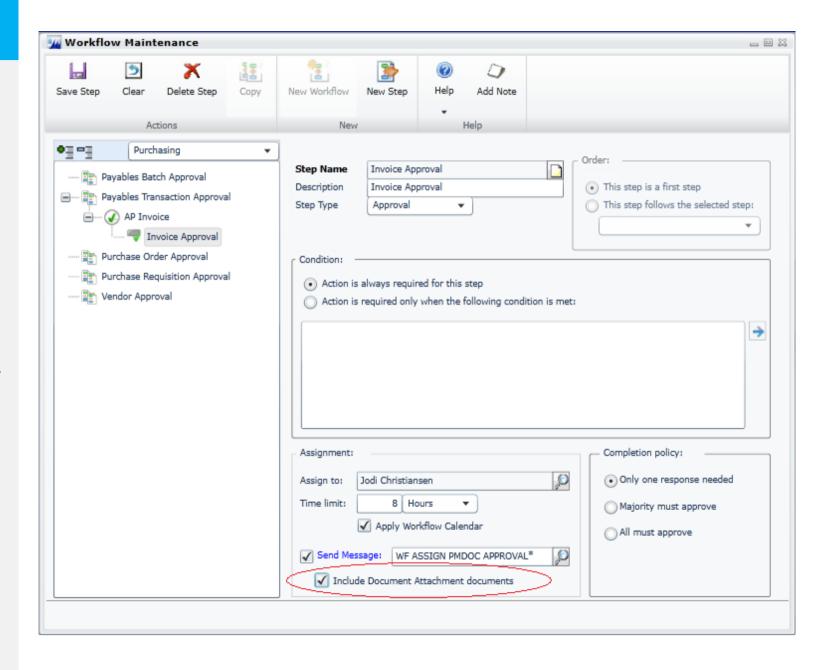
## Scriptable GP Provisioning and Management

- PowerShell cmdlets
- Install (GP components)
- Configure (create databases, add tenants)
- Templates
- Set parameters
- Override with run specific parameters
- Remoting
  - Execute cmdlet on remote computers



## Document Attachments for Workflow Email

- Send Document
   Attachments files with workflow task notification emails
  - -Scan payables invoice and attach it to the transaction
  - -Submit through workflow
  - -Workflow notification email will have scanned invoice attached along with pertinent details of payables invoice for the approver



## Dynamics GP 2015 R2 All in One Document Viewer Demo



# Azure. Web Client. Apps.

### Microsoft Dynamics GP on Azure

**Azure Cloud** 

OS SQL Server



**Pre-Configured** 

Domain Web Server Reporting Server



Dynamics GP



**On-Premises** 

Hardware OS SQL Server



Domain
Web Server
Reporting Server



Dynamics GP



## Estimating Azure Costs





Determine number and size of servers required



Determine storage requirements



Estimate outbound data transfer



Acquire licenses

### Monthly cost estimate for a 15 user web client deployment.

Web Server (A2) = \$133.92

SQL Server (A2) = \$133.92

(SQL license mobility)

Active Directory = \$ 66.96

350 GB

storage)

(locally redundant

= \$16.25

15 GB

= \$1.20

(1GB/user/month)

GP - Purchase perpetual, subscription or SPLA licenses the same as you would for an on-premise deployment.

Total/month = \$334.80

Total/month

= \$16.25

Total/month = \$1.20

SQL – Purchase SQL Server license with license mobility under Software Assurance.

### Microsoft Dynamics GP Web Client

The web client effort focused intently on reducing hosting costs while maintaining the quality user experience and extensibility customers expect

Performance is comparable to Terminal Services and web client scales better

### ISV applications will work

Same business logic is used for web and desktop clients

Support for "Mixed Mode".

Support for <u>BOTH</u> desktop client and web client on the same server



### Encryption

Fully encrypted login
All client–server interactions
Optionally between services
Https/Secure Sockets—certificates required

### Windows or Azure authentication

Single login to landing site and Microsoft Dynamics GP Mitigates Denial of Service attack

Microsoft Dynamics GP security remains



### Web client for You



Deployment options that fit customer needs



#### Small

Single server deployment for customers with less than 20 users

#### **Large/Multi Tenant**

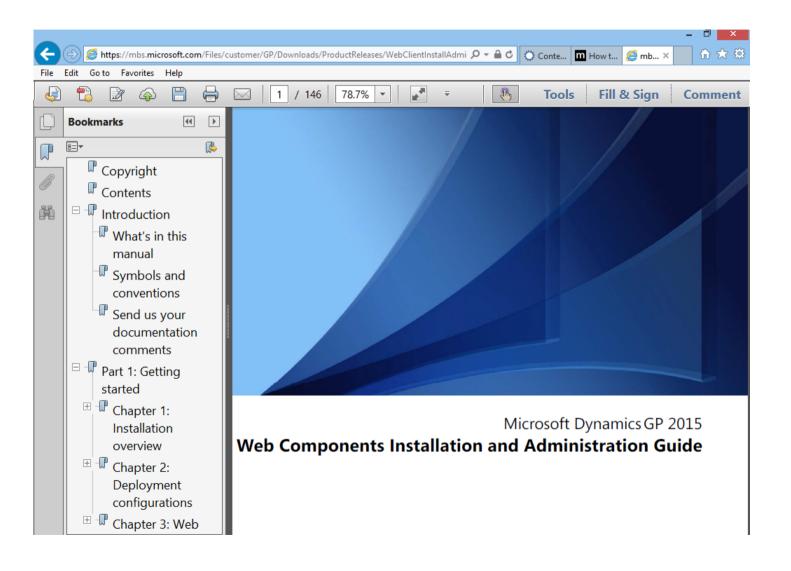
Quickly scale to hundreds of users by adding additional servers



On-premises or cloud



## Deployment guides



2015 documents up to date

Installation Guide includes Service Based Architecture

Hosting and Deployment White Paper

### Dynamics GP Device Apps & O365



## Dynamics Business Analyzer 7







#### **Windows 8 Tablet**

- Initial Release Jan 2013
- Release 7 July 2014
- Excel, SSRS and MR content
- Available in Windows store

#### **Apple iPad**

- Initial Release Sep 2014
- Excel, SSRS and MR content
- Available in iTunes store

#### **Android Tablet**

- Initial Release Oct 2014
- Excel, SSRS and MR content
- Available in Google Play store

# Dynamics GP Office App

Microsoft Excel-based dashboard information in Microsoft Office 365 SharePoint Online

View Microsoft Dynamics GP information for

Financial

Sales

Inventory

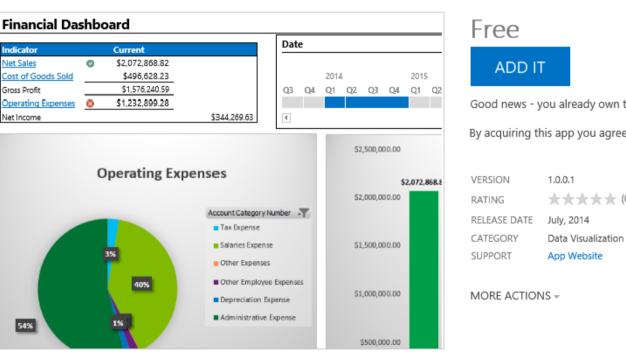
Purchasing

Refresh data and drill to details in Microsoft Dynamics GP



#### Microsoft Dynamics GP Workspace

from Microsoft Corporation



Good news - you already own this app.

By acquiring this app you agree to its permissions.

\*\*\*\* (0)

Data Visualization + BI, Financial Management



#### Dynamics GP Time Management App



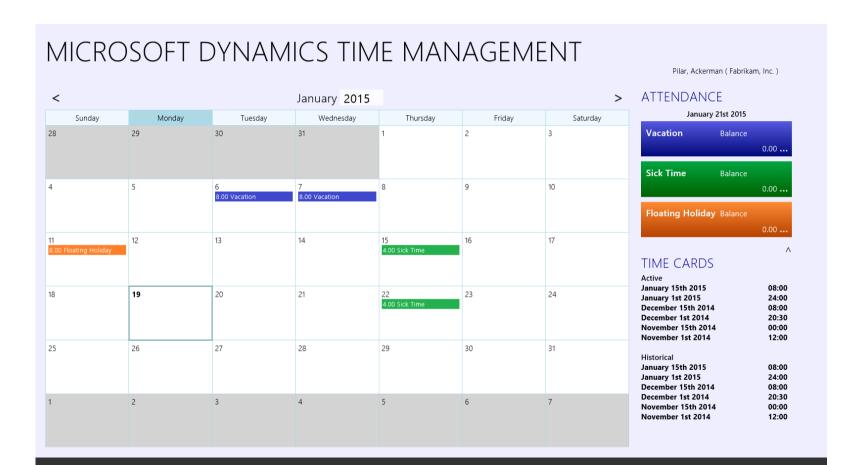
#### Windows Tablet



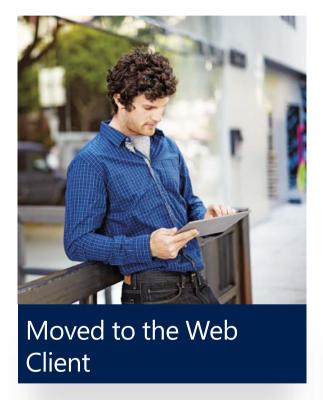




**Android Tablet** 



#### Workflow





Removed SharePoint Dependency





# Workflow Types

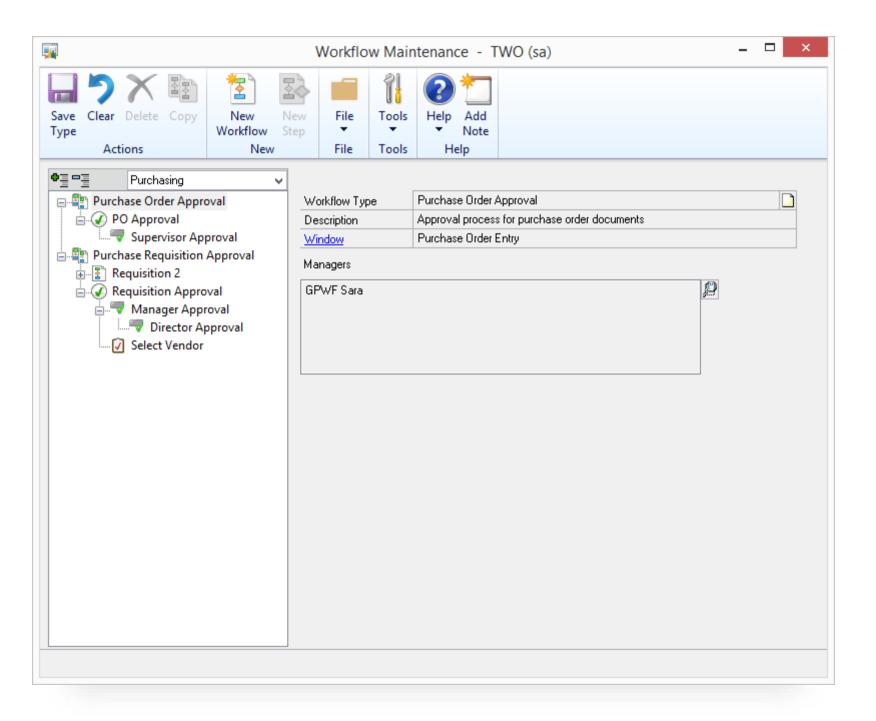
#### Dynamics GP 2013 R2

- Purchase Order Approval
- Purchase Requisition Approval
- Payroll Timecard Approval
- Project Timesheet Approval

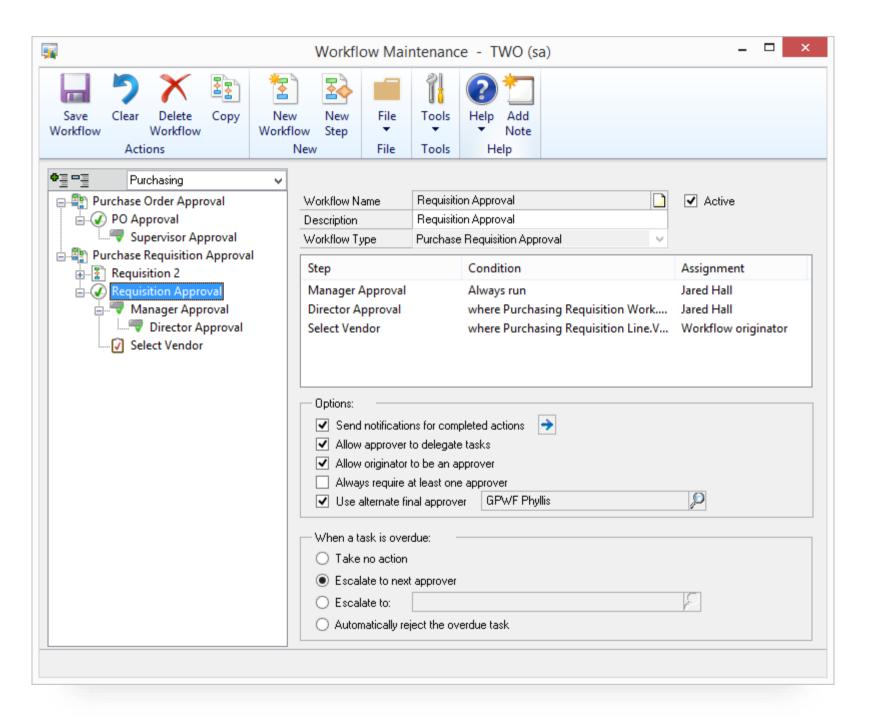
#### Dynamics GP 2015

- General Ledger Batch Approval
- Receivables Batch Approval
- Payables Batch Approval
- Vendor Approval
- Employee Profile Approval
- Employee Skills Approval
- Direct Deposit Approval
- W4 Approval
- Project Expense Report Approval

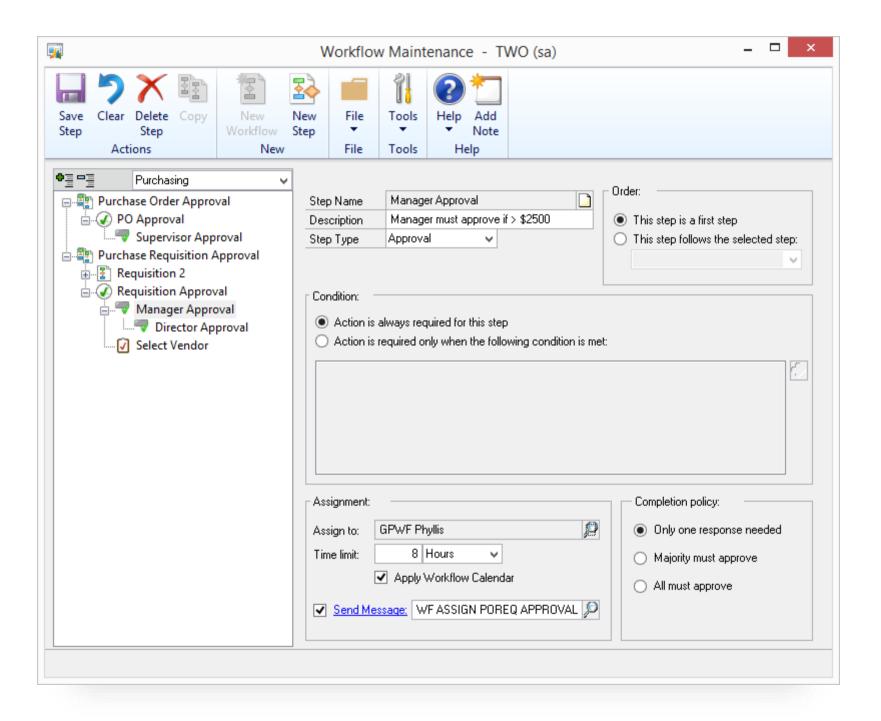
# Type Maintenance



#### Workflow Maintenance



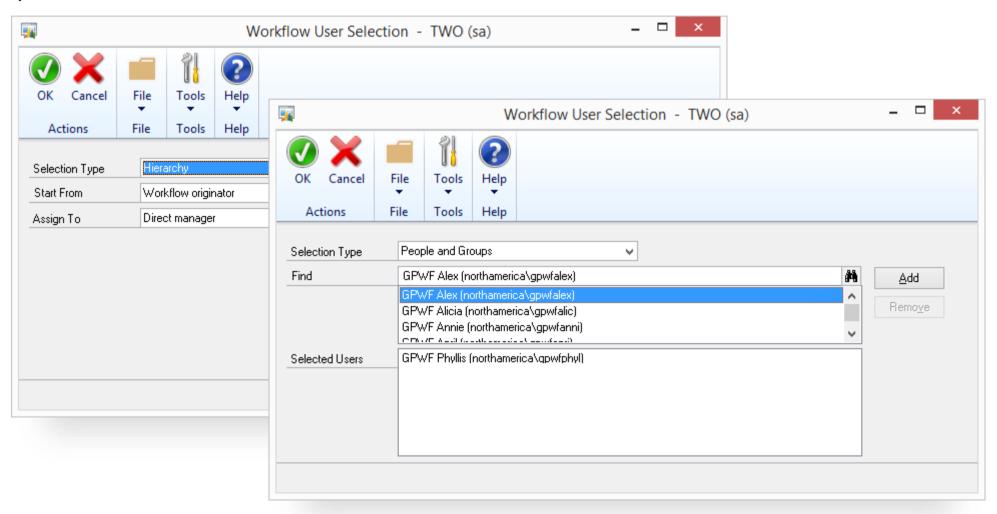
#### Step Maintenance



#### Workflow User Selection

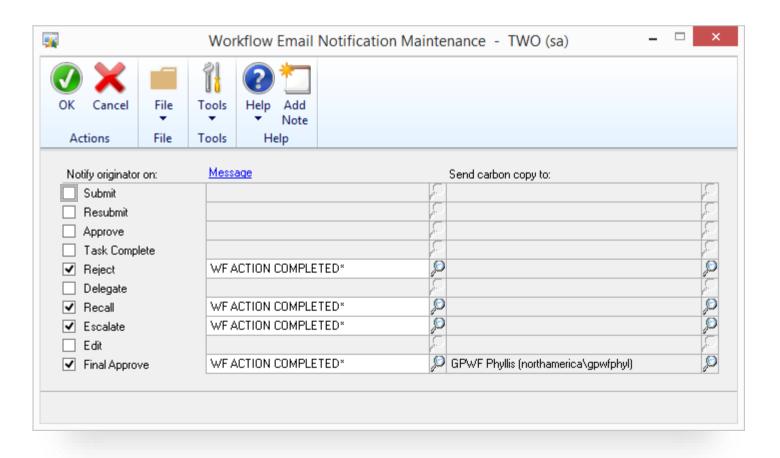
#### Selection Types:

AD User(s)
AD Groups
AD Hierarchies
Workflow users

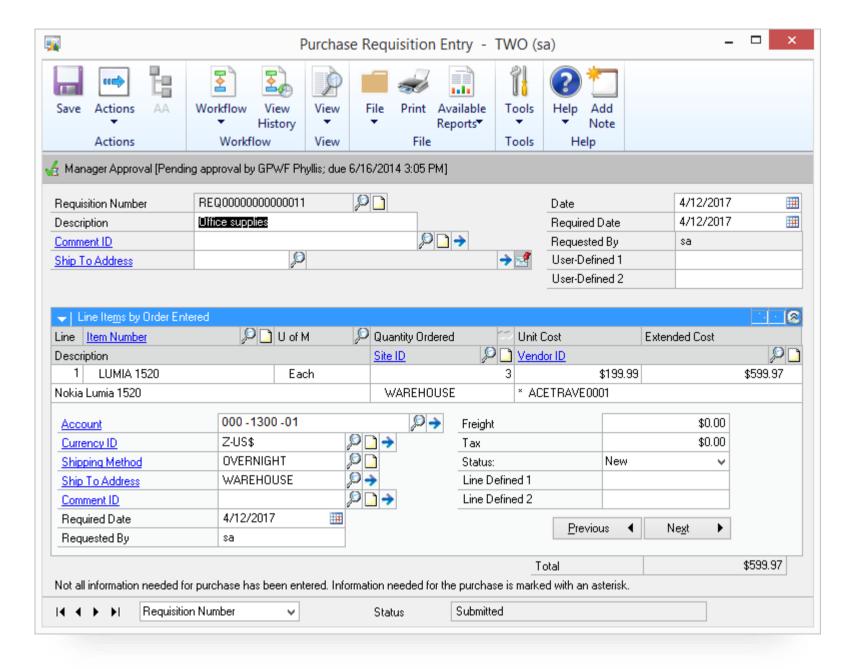


## Workflow Options

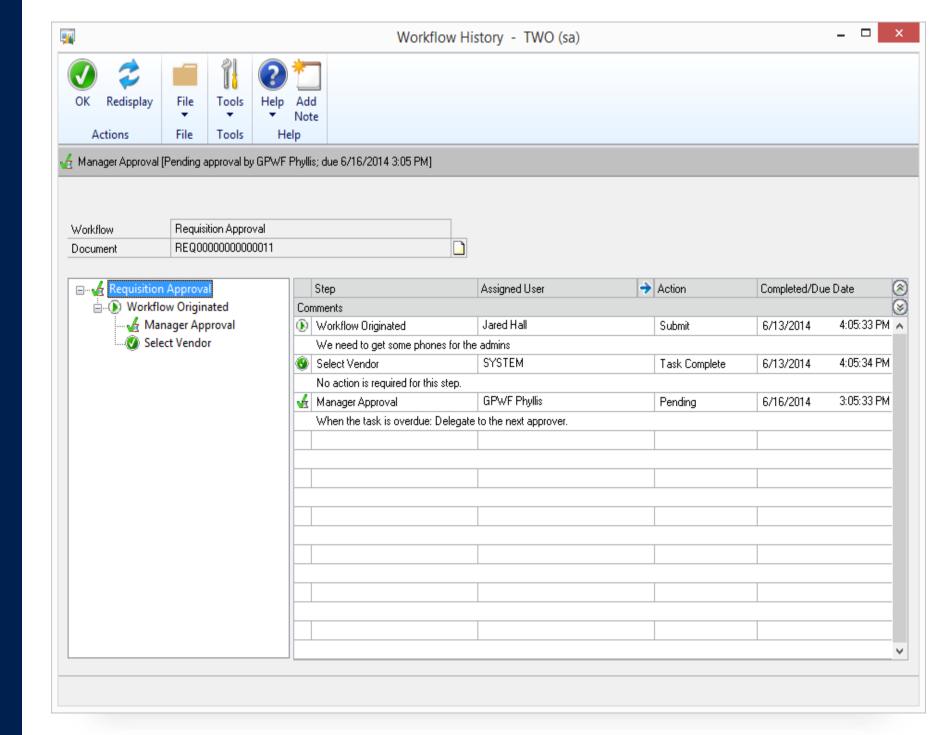
#### Send notifications for completed actions



# Transaction Entry

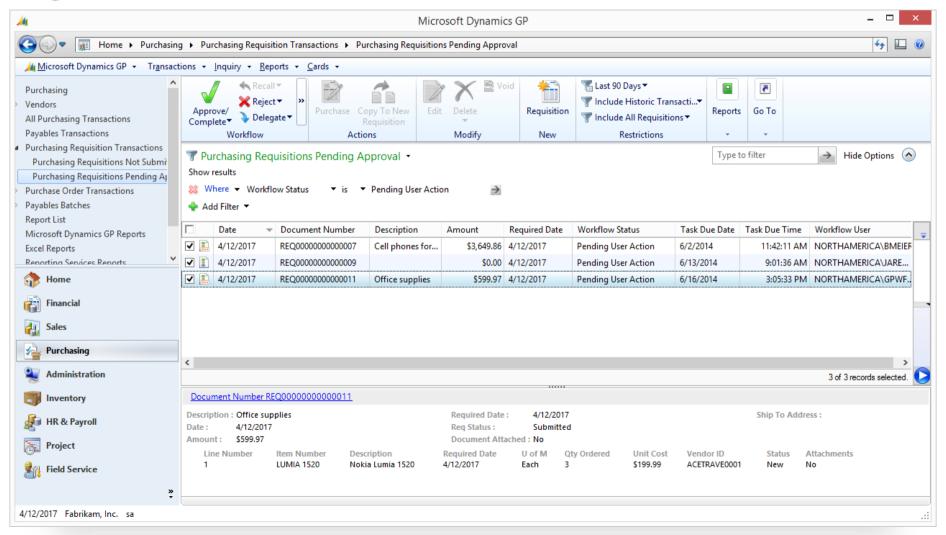


# Workflow History

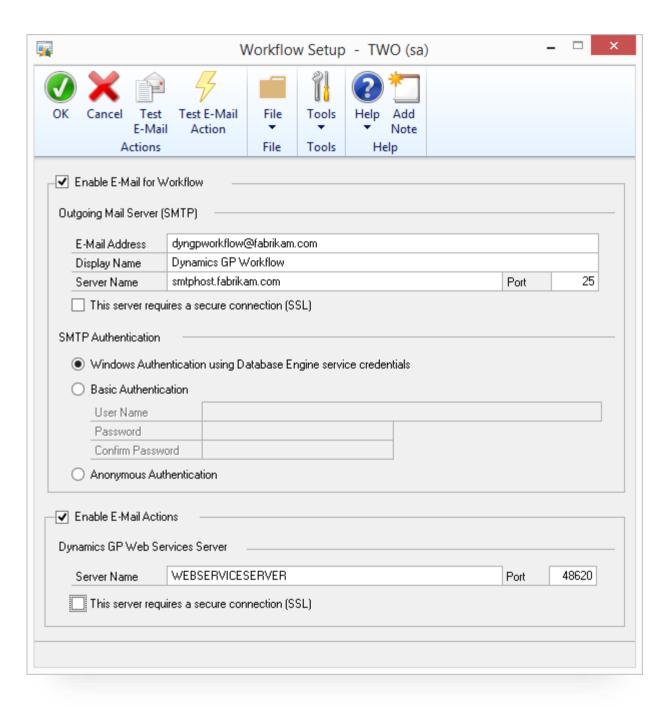


#### Notification and Action

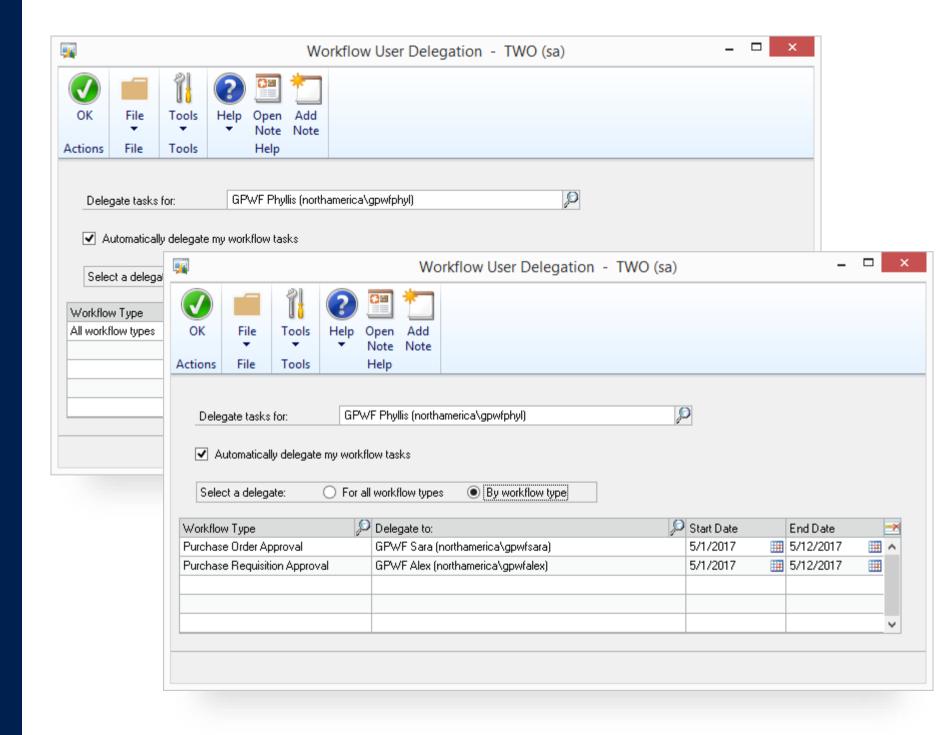
#### GP Navigation Lists



# Workflow Setup



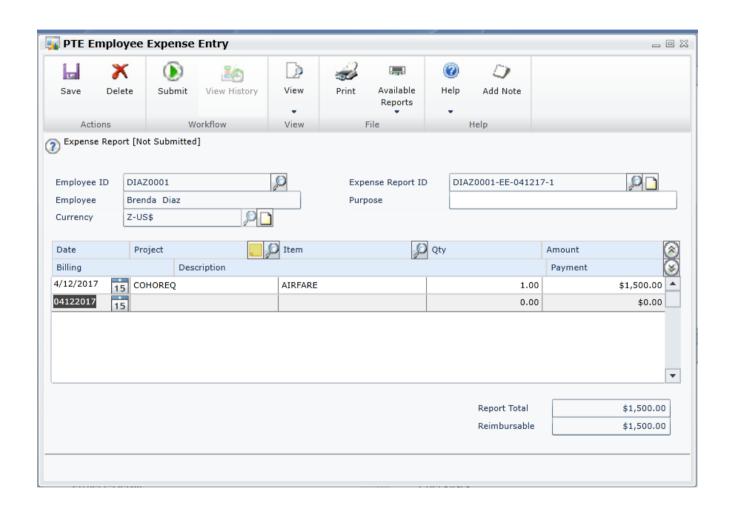
#### Out-of-Office Delegations



# Dynamics GP 2015 Feature Highlights

#### Project Employee Expense Report

Project Employee Expense Report and Project Timesheet Entry replace all of the functionality of both Business Portal T&E and PDK!



# Top Feature Review

#### Financials

#### Dynamics GP 2013 SP2

Display Checkbook ID on Cash Receipts Inquiry

**Customer Combiner &** Modifier

**Vendor Combiner &** Modifier

Payables Void Enhancements

Reconcile Checkbook without Marking Transaction

AA Finance Charge Assessment

AA and Sales Order deposits

#### Dynamics GP 2013 R2 Dynamics GP 2015

Copy and Paste to GL

Roll Down Account **Segment Description** 

Reverse Fiscal Year

Reprint Outstanding **Transactions Report** 

Default Sort order for

Payables Checks

**Payables Transaction Document Attach** 

Default Asset ID from Fixed

**Asset Class** 

Integrate Multi-currency Revaluation with AA

General Ledger Batch Workflow

Payables Batch Workflow

Vendor Approval Workflow

Receivables Batch Workflow

Intercompany enhancements

Fixes Assets Year End Close Report

Edit E-mail for historical Statements and Payables Remittance

#### Distribution

#### Dynamics GP 2013 R2

Suggested Item Enhancements

Assign Item to Multiple Sites

**Purchase Requisitions** 

Purchase Requisition

Workflow

Purchase Order Workflow

**Prepayment Additions** 

**Encumbrance SSRS Reports** 

Project Time

**Project Time Workflow** 

#### Dynamics GP 2015

Edit Email for Historical documents – Sales and Purchasing

Payables warn when open Purchase Order

Payment Terms Enhancements Invoicing on Web Client

# Employee Self Service

#### Dynamics GP 2015 R2

Purchase Requisition

Payroll Timecard

Project Timesheet

Home Page Parts

Simplified Navigation

Requisition Workflow

Timecard Workflow

Project Time Workflow

#### Dynamics GP 2015

Employee Profile

Paystubs

W4

Benefits

Direct Deposit

Skills & Training

Project Expense

Profile Workflow

W4 Workflow

Direct Deposit Workflow

Skills Workflow

Manager Profile

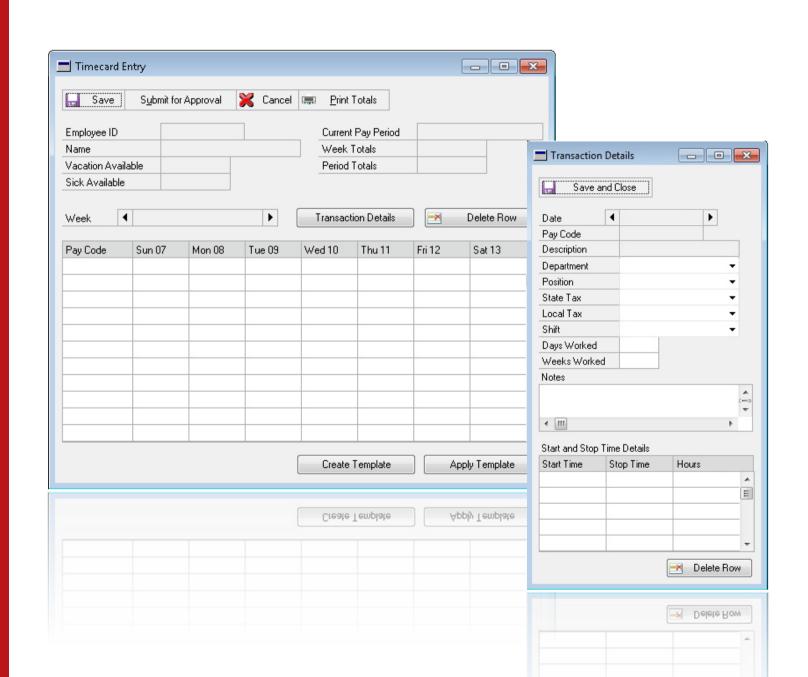
Manager Skills

#### Time Management

Self-Service User

Allows Entering 'Time on Behalf Of'

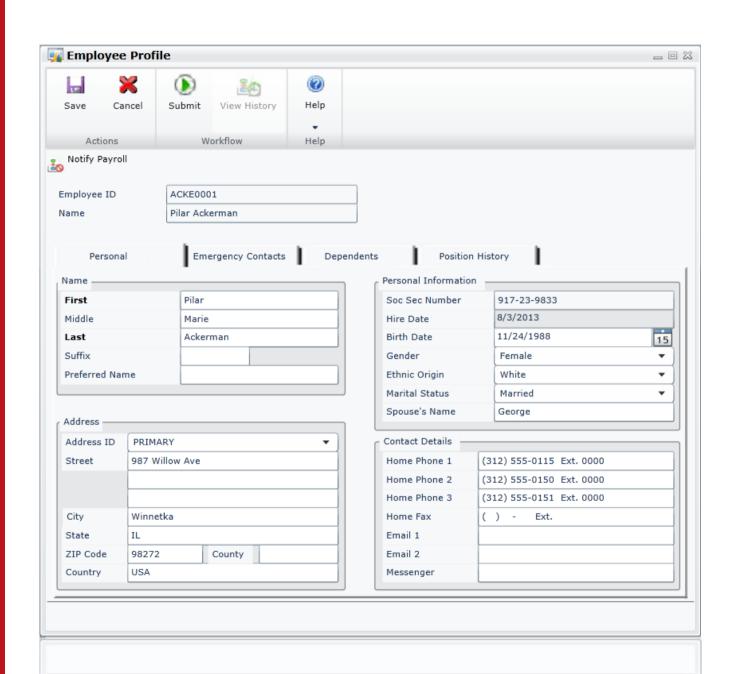
**Approval Workflow** 



#### Employee Profile

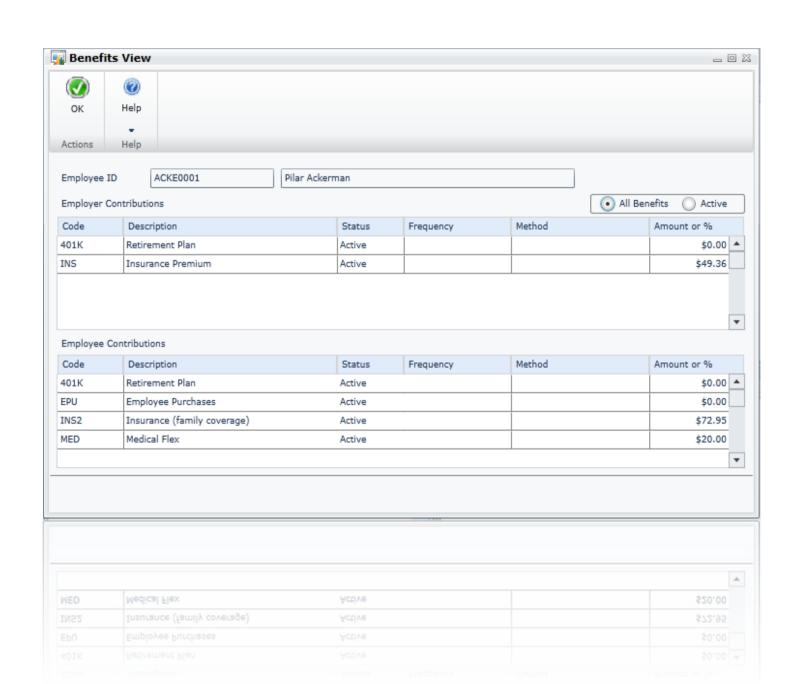
Employee can view and edit their employment information

Address, Dependents, Emergency Contacts and Position History



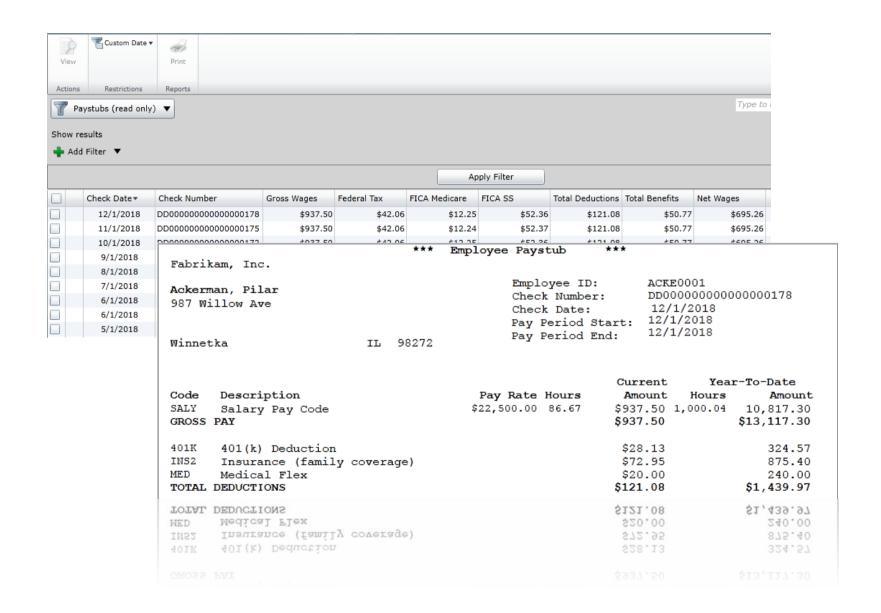
# Employee Benefits

Employee can view their benefits with employer and employee contributions



# Employee Paystubs

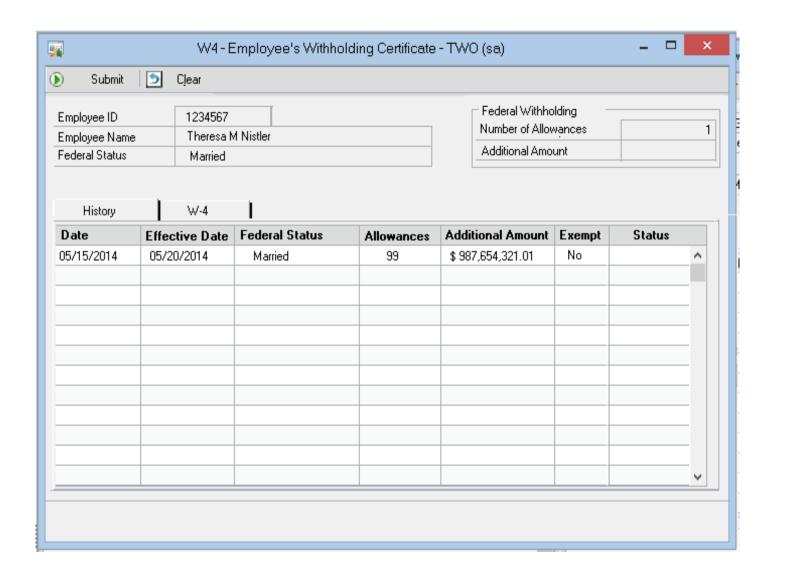
An employee can view or print their paystubs from the paystubs navigation list



#### Employee W4

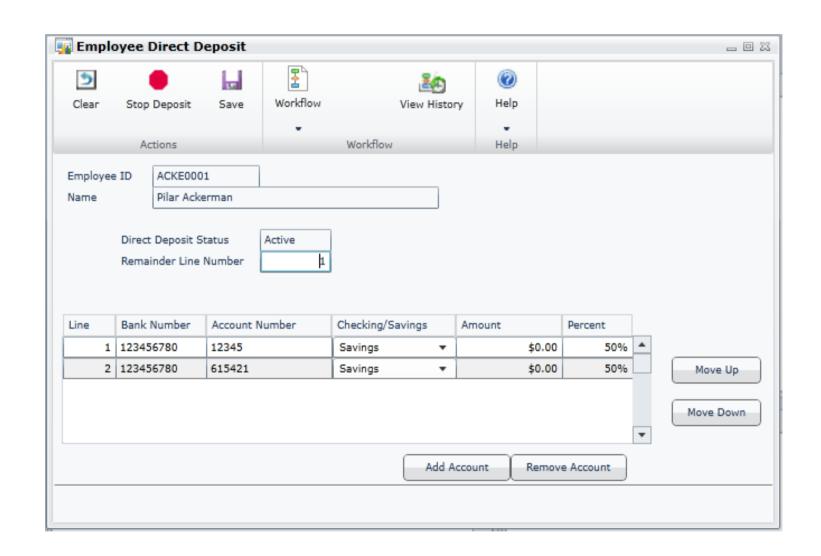
Edit W4 information, add or change additional withholding, and update deductions

Workflow Available



# Employee Direct Deposit Edit deposit information, add accounts or change the distribution

Workflow Enabled

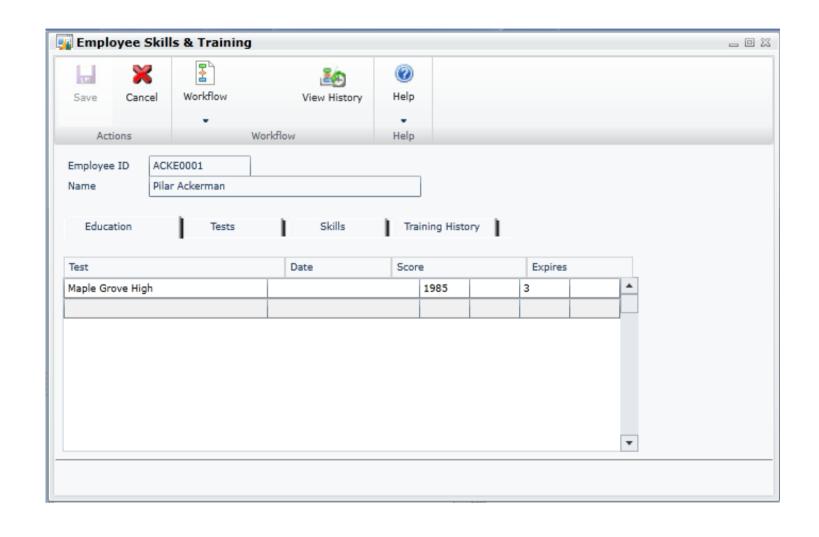


# Manager Skills and Training

Manager can view and maintain their employee's education and tests

View employee's skills and training history

From navigation lists



# Service Based Architecture — Deep Dive



#### End Point URI Structure

PATTERN: [Context]/[Resource Path(keys)]?[Query String]

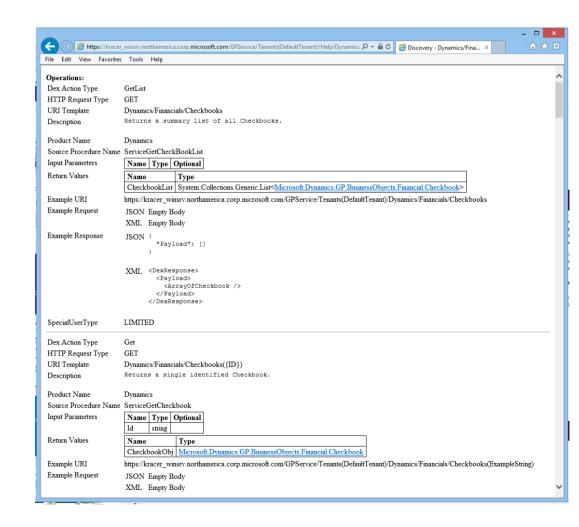
#### Hypothetical Examples

```
GET .../Tenants(Default)/Companies(Contoso)/Sales/Customers(AARONFITZ0001)?someflag=true
POST .../Tenants(Default)/Companies(Contoso)/Sales/Customers

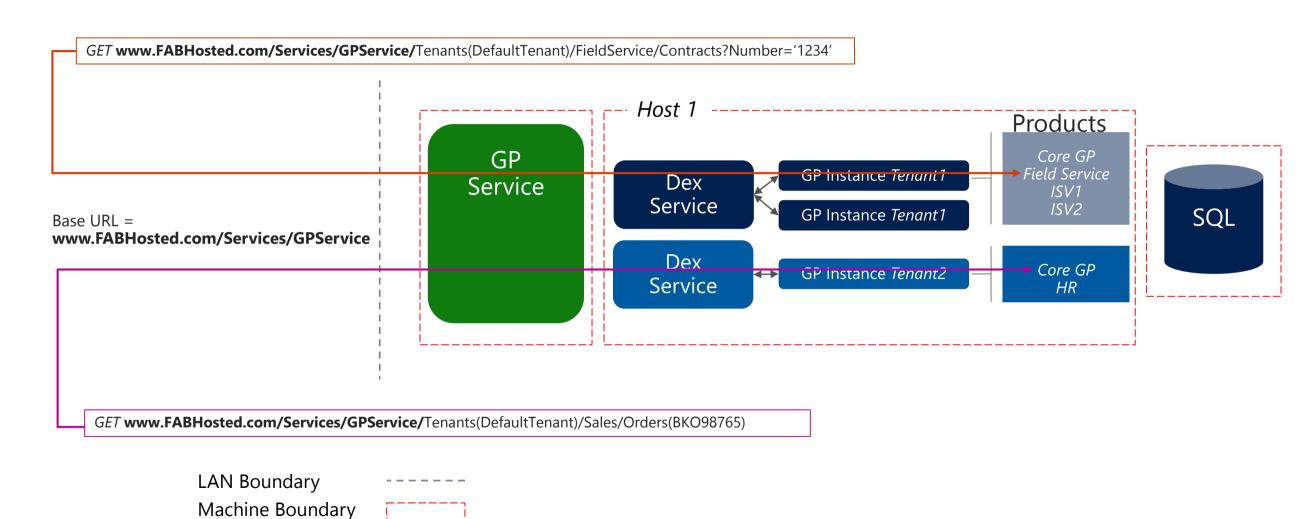
DELETE .../Tenants(Default)/Companies(Fabrikam.%20Inc)/Manufacturing/Boms(WIDGET123)
GET .../Tenants(Default)/Companies(Fabrikam.%20Inc)/Products(Id=346)/Boms?limit=20
```

### Discover your endpoint

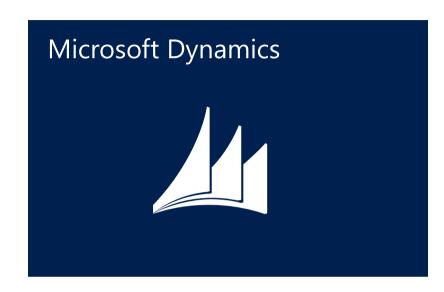
- Discover available operations on a live deployment – just add /Help
- Use to model your code or extract info from system
- Provides info on objects, parameter requirements
- Discovery not filtered by security you may see operations you can't call
- Example URI does not provide company context



#### Service Call in Action



## Acquire a Microsoft Dynamics GP App







Microsoft Dynamics GP Time and Attendance

**Binary Stream** 

eOne

Horizons

Ethotech

Encore

#### Get and analyze data

#### Office Tools

- Native Excel Web Queries (xml)
- Power Query Better tool to leverage REST services
- Power View awesome visuals from worksheet data
- Power Map if you have geolocation data

#### Portable and Secure

- Authentication built in
- Encryption end to end

### Build an app

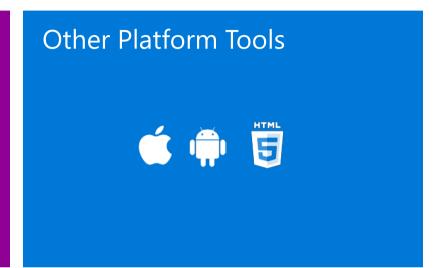


Custom app with Visual Studio
- Microsoft Dynamics GP helper in Visual Studio next



#### Sienna

- Consumer/end user tool
- Free
- Builds Windows 8 apps

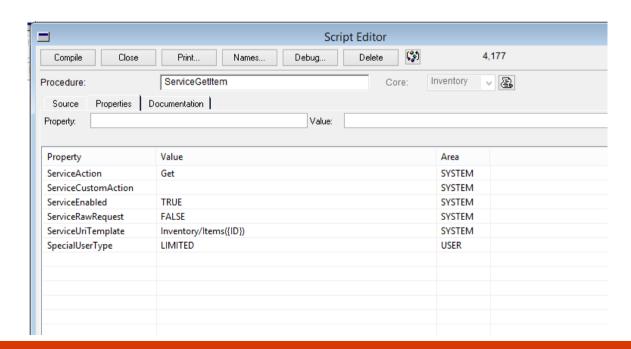


Needs to support

- http (web) requests
- JSON or XML
- Windows or Org Identity PostMan app in Chrome

#### What's behind an operation?

- Dexterity sanScript + .NET interop
- New global procedure type Service Procedure
- Added properties describe operation
- Documentation flows through to Discovery

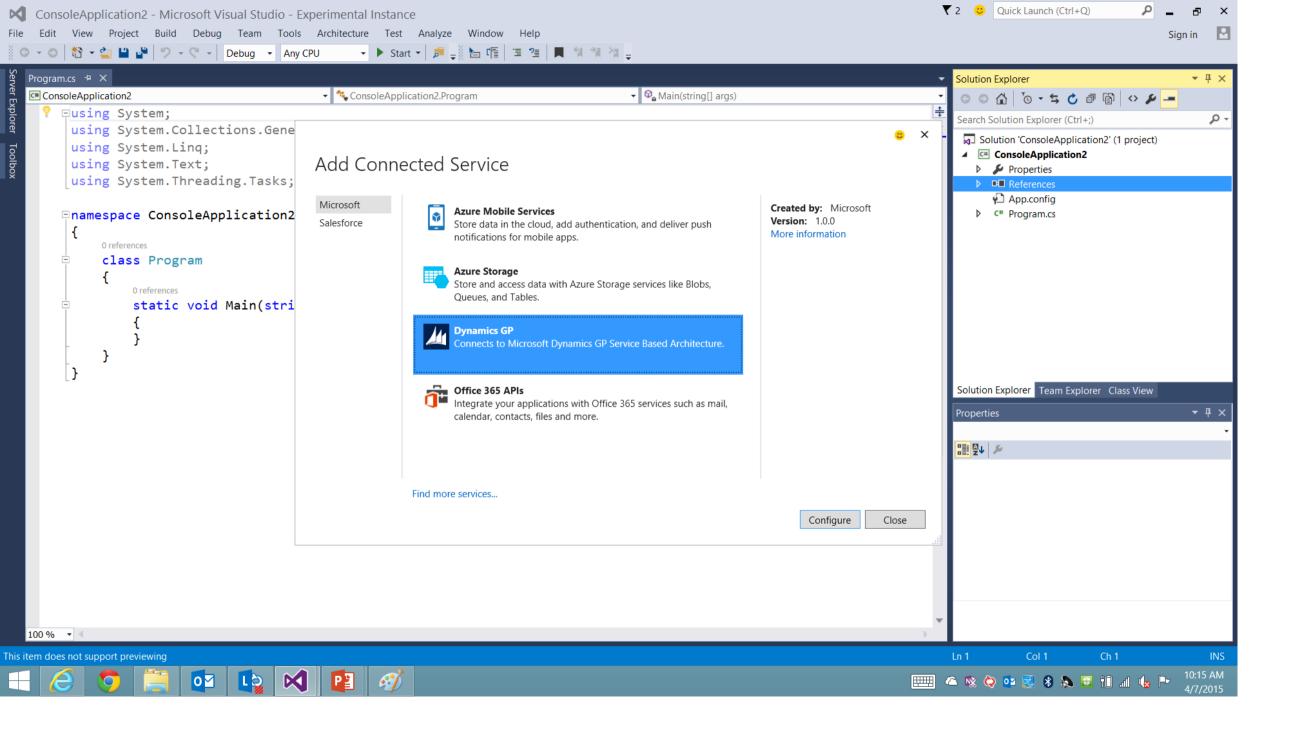


#### Service Procedure Properties

- Action maps to http verbs + custom POST option
- CustomAction tag to identify a non crud operation
- Enabled DAG recognizes if TRUE
- RawRequest you get the raw html stream
- URI Template resource path used to invoke and bind non managed parameters
- Special User Type available to limited users

# Developer Experience

- Create any .NET objects for data I/O
- Create your Service Procedure(s)
- Use DAG to create your assembly
- Chunk Dictionary
- Deploy your assembly alongside the dictionary

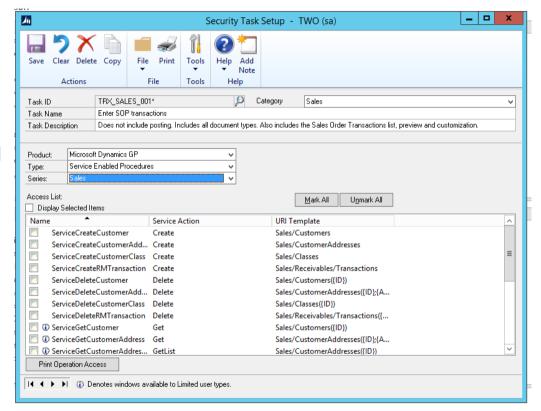


#### Security

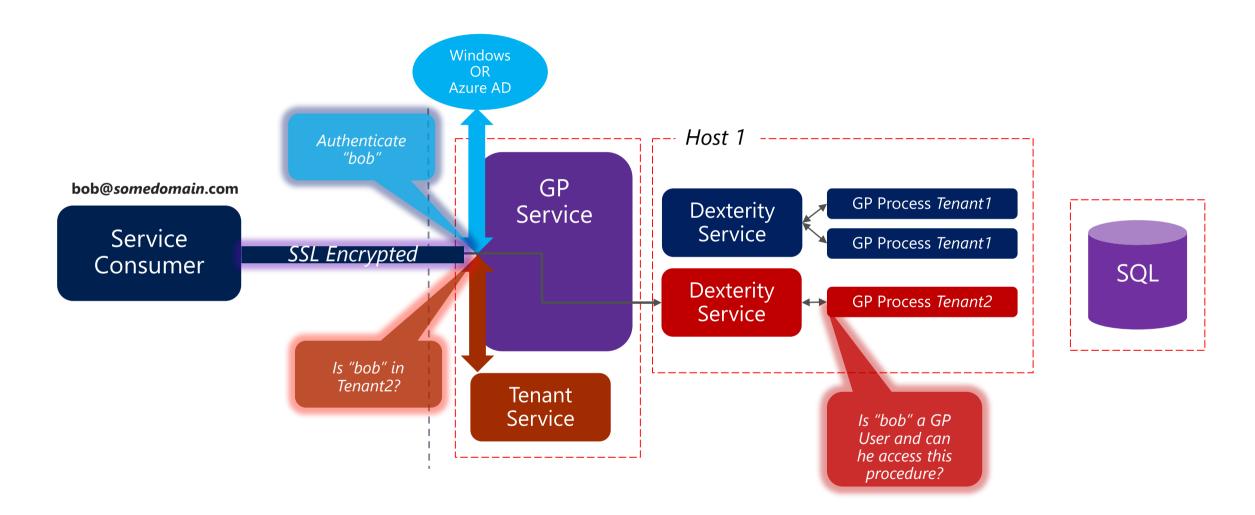
Fully Encrypted with SSL

 Consumers must be a GP User with AD or Org Account mapped

Roles/Tasks authorize operations

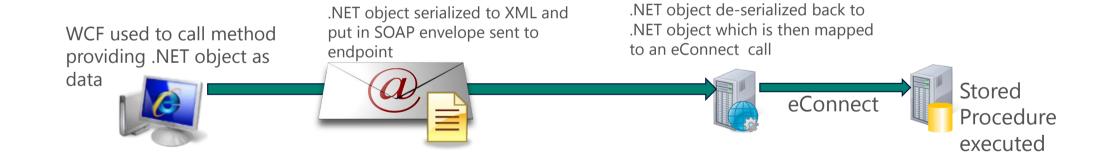


## Security Flow



#### Microsoft Dynamics GP Services – V1

Microsoft Dynamics GP Web Services
Based on SOAP protocol with XML 'documents' as a payload
Underlying logic was eConnect sql procedures (duplicated from client)
Security was standalone and separately configured (could be 'synched' to Microsoft Dynamics GP)



#### Service based architecture advantages

- Uses the language of the Web
- Many tools and off the shelf apps support REST
- Http protocol supported by most development languages
- Leverages dexterity and existing logic
- Integrated security + encryption
- SSL communications encrypted end to end
- Users are in the GP System one place to maintain users
- Security by role
- Discovery

### Parts included, some assembly required

- Included on install media under Web Components
- Do not have to install Web Client
- Can install side by side with Web Client (same machine)
- No additional license needed
  - Users will need to have a Microsoft Dynamics GP User/license
- Requires an SSL Certificate
- Deployment guide available
- Web Management Console

#### Partner Benefits

- Companion/Mobile app opportunities
- A recent survey by <u>Vision Mobile</u> found that just 16% of worldwide developers are building mobile apps for enterprises
- Ability to leverage managed code
- Integrate to any desired GP functionality
- CRUD & non CRUD operations
- Maintain existing Dexterity investments

## "relMAGINE the possibilities"

- This is more than just a bunch of web services
  - It's a framework
  - It's an enabler
- Think broadly first then narrow your focus
- Anything that benefits from mobility is a candidate

